

REMARKS/ARGUMENTS

The Requirement for Restriction/Election mailed March 4, 2008 has been received and carefully noted. Restriction to one of the following inventions is required under 35 U.S.C. 121:

- I. Claims 1-16 and 49-58, drawn to method and system for imaging markers and determining coordinates relative to a beam isocenter, classified in class 600, subclass 426.
- II. Claims 17-20 and 59-60, drawn to a method for adjusting a position of a volume within a body relative to a treatment beam using a plurality of markers, classified in class 600, subclass 427.
- III. Claims 21-27, drawn to image processing of an image involving a median filter, classified in class 382, subclass 128.
- IV. Claims 28-30, drawn to image processing of an image involving a 2D size and shape consistency test and a 3D geometric consistency test, classified in class 382, subclass 128.
- V. Claims 31-41, 46-48, and 61, drawn to a method of imaging markers in the body and adjusting the body and treatment beam based on a rigidity of the target and the number of visible markers, classified in class 600, subclass 427.
- VI. Claims 42-45, drawn to a method of imaging markers in the body and estimating the number of positioning images needed for a treatment session based on the rigidity of the target and the number of visible markers, classified in class 600, subclass 427.

In response, Group I set of claims 1-16 and 49-58 is hereby elected with traverse for further prosecution in this application. Restrictions of Groups I, II and V is traversed. Accordingly, Groups III, IV and VI are withdrawn by this amendment.

Applicants traverse that Group II, claims 17-20 and 59-60 are properly restricted from Group I. Specifically, independent claims 1 and 17 overlap in scope insofar that both claims require a body having internal markers, imaging the markers in a first imaging modality, imaging the markers in a second imaging modality. Furthermore, the claim 17 requirements of adjusting a position of a target volume relative to a treatment beam, and the claim 1 requirements of determining first coordinates of the markers relative to a first beam isocenter, are not necessarily mutually exclusive. It can

be appreciated that the beam isocenter of claim 1 and the treatment beam of claim 17 may be the same beam. Moreover, the determined first coordinates of claim 1 may be used to perform the adjusting a position of a target volume of claim 17. Hence, Applicants respectfully request reversal of the restriction of Groups I and II.

In addition, Applicants traverse the restriction of Groups II and V as independent claims 17 and 31 overlap in scope. Specifically, both claims require internal markers to a body, and imaging the markers. Furthermore, the claim 31 requirements of estimating an adjustment to the body or a treatment beam, in part based on the imaged markers; and the claim 17 requirements of adjusting a position of a target volume within the body using the imaged markers, are not necessarily mutually exclusive. Hence, Applicants respectfully request reversal of the restriction of Groups II and V.

Finally, Applicants traverse restriction of Groups I and V as independent claims 1 and 31 overlap in scope. Specifically, both claims require internal markers to a body, and imaging the markers. Furthermore, the determined first coordinates of claim 1 may be used to perform the estimating an adjustment to the body or a treatment beam, and are thus not necessarily mutually exclusively. Hence, Applicants respectfully request reversal of the restriction of Groups I and V.

Additional Claims 62-81

Applicants submit additional claims 62-81 and submit that no new matter is added therein. Specifically, the additional claims are supported at least by the current claims as follows:

Claim 62 by claim 17; claims 63-72 by claims 31-41; claims 73-75 by claims 46-48; claims 76-77 by claims 59-60; and claims 78-81 by claims 22-25.

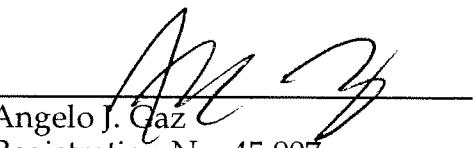
CONCLUSION

In view of the foregoing, Applicants respectfully request reversal of the restriction of Groups II and V. If the Examiner believes a telephone conference would be useful in moving the case forward, he is encouraged to contact the undersigned at (310) 207-3800.

If necessary, the Commissioner is hereby authorized in this, concurrent, and future replies, to charge payment or credit any overpayment to Deposit Account No. 02-2666 for any additional fees required under 37 C.F.R. §§ 1.16 or 1.17, particularly extension of time fees.

Respectfully submitted,

Dated: April 4, 2008

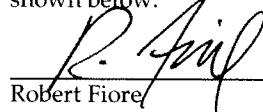


Angelo J. Gaz
Registration No. 45,907

1279 Oakmead Parkway
Sunnyvale, California 94085-4040
Telephone (310) 207-3800
Facsimile (408) 720-8383

CERTIFICATE OF TRANSMISSION

I hereby certify that this correspondence is being submitted to the United States Patent and Trademark Office electronically via EFS Web on the date shown below.



Robert Fiore

4/7/08

Date